



SCHOOL-BASED ASSESSMENT

Assessment for Learning: Research into practice

Comment:

This document is designed to support the assessment for learning primary-focused video and provides a starting point for discussion.

Many teachers, schools and LEAs are choosing to implement assessment for learning in their classrooms; this manifests itself in different classroom practices and builds on teachers' existing expertise, formative assessment interests and the learning needs of their school communities.

This document is not intended to promote a particular vision of assessment for learning but rather hopes to share the experiences of two schools involved in an action research project in order to contribute to the debate on teacher assessment.

With thanks to Isambard Brunel Junior School and St John's Cathedral Catholic Primary School in Portsmouth, and Shirley Clarke

What is Assessment for Learning?

"Assessment for Learning is the process of seeking and interpreting evidence for use by learners and their teachers, to identify where the learners are in their learning, where they need to go and how best to get there."

©Assessment Reform Group, 2002

*Assessment for Learning:
10 Principles*
ARG, 2002

Assessment for learning (AfL) has developed through a fusion of research and classroom practice. The research-based principles that underpin assessment for learning evolved from an extensive review of formative assessment conducted by Black and Wiliam and were identified as:

- The active involvement of children in their own learning
- The provision of effective feedback to children
- A recognition of the profound influence assessment has on motivation and self-esteem of children, both of which are crucial influences on learning
- The need for children to assess themselves and understand how to improve
- Adjusting teaching to take account of the results of assessment

They concluded that where assessment for learning is embedded in the culture of a school, it could lead to an improvement in external test results and children more likely to be lifelong learners. Additional action research by schools, LEAs and researchers has continued to reinforce the benefits of formative assessment, so much so that both the DfES and Ofsted have increasingly emphasised the important contribution assessment for learning can make in curriculum and assessment planning.

*Assessment for Learning:
Beyond the Black Box*
ARG, 1999

Assessment for learning has its roots in classroom practice, and is about striving to improve children's learning through known research principles, with teachers acting as 'action researchers' continually re-defining practice for themselves according to those principles. These features of AfL are inter-related, with the active involvement of children in their own learning (eg being clear about learning objectives and success criteria, being involved in self-assessment and paired discussions about learning achievements) under-pinning all other elements.

*Excellence & Enjoyment: A
strategy for primary schools*
DfES, 2003
*The national literacy and
numeracy strategies and
the primary curriculum*
Ofsted, 2003

About these materials

This document and the video aim to unpick some of the research principles and illustrate how they have been interpreted by two schools that have chosen to prioritise assessment for learning. Isambard Brunel Junior School and St John's Cathedral Catholic Primary School have been participating in an action research project organised by Portsmouth LEA with Shirley Clarke. Fourteen schools are involved in the project, with two teachers from each school committed to taking forward various aspects of assessment for learning. The teachers chose techniques that they felt most appropriate to the needs of their learners and the school's priorities. As well as sharing their experiences with other teachers involved in the project, teachers have been involving their colleagues and generating discussion and collaboration in classroom practice. Portsmouth LEA have commissioned the University of Sussex to provide an evaluation of the project – one of the most powerful claims of assessment for learning is the ability to demonstrate real improvement in children's learning.

See also:
*Gillingham Partnership:
Formative Assessment
Project, 2000-2001*
Shirley Clarke
www.qca.org.uk/afl

If you decide to introduce AfL in your school, it is important to build on existing practice, to be consistent in the application of the features and to plan for assessment opportunities based on knowledge of the children and their preferred learning styles.

Headteachers and teachers who have introduced AfL into their classrooms emphasise, that it is important to take it one step at a time and involve colleagues in discussion and analysis to ensure a deeper level of understanding of the principles. Assessment for learning is an integral part of learning, not a 'quick fix', and can take two to three years to become truly embedded in a school's learning culture. The features of AfL need to be integral and seen as essential elements in developing learning fitted to the design of a lesson, rather than 'fitted in' as extra activities.

Starting points may vary, eg:

- school conducts a self-evaluation to identify areas on which to concentrate;
- keen teachers begin to trial it first and then feed back findings to colleagues;
- teachers make their own choice in what and how to implement principles;
- all teachers in the school begin with one element only.

The video demonstrates ways in which some teachers have put AfL into practice in their classrooms – it gives examples of what AfL can look like rather than definitive answers. These materials are just a starting point; there are many more resources available and referenced on the QCA website which cover research and practice in more depth.

www.qca.org.uk/afl

In the video we identify 5 research-based features of assessment for learning:

- actively involving children in their own learning
- providing effective feedback to children
- recognising the impact of assessment on children's motivation and self-esteem
- children assessing themselves to identify how to improve
- adjusting teaching based on the results of assessment

This document takes each feature and expands on the research, provides more information on classroom practice, and identifies questions you might find useful in taking forward assessment for learning. As the features are inter-linked, ideas may appear in more than one section.

What is meant by 'actively involving children in their own learning'?

"Current thinking about learning acknowledges that learners must ultimately be responsible for their learning, since no-one else can do it for them. Thus assessment for learning must involve pupils, so as to provide them with information about how well they are doing and guide their subsequent efforts."

*Assessment for Learning:
Beyond the black box*
Black & Wiliam, 1999

The active involvement of children is crucial to the success of formative assessment – it's more than children being busy and engaged with the task. Lessons need to provide opportunities for children to reveal their own understanding of criteria for success to their peers or teachers, and then to have time to improve the work. Such opportunities are the result of careful planning and structuring of the lesson by the teacher – the video illustrates some of the methods used by the two schools to encourage children to become more actively engaged in their own learning.

AfL action research projects have found that children can become more autonomous learners as a result of active involvement in their own learning. "Students [were] also much more aware of when they were learning, and when they were not. This ability to monitor one's own learning may be one of the most important benefits of formative assessment". Practice that you might consider appropriate for your classroom includes:

*Assessment for Learning:
putting it into practice*
Black et al, 2003

- Training children to understand their own work – they need to understand the learning objectives and success criteria
- Using peer-response partners for feedback
- Using peer and self-assessment
- Developing more effective questioning – this can include changing the nature of the question/assessment with a move away from closed questioning to questions requiring more sophisticated thinking, eg
 - How can we be sure that?*
 - How would you explain?*
 - What does that tell us about?*
 - What is the same and what is different about?*
 - How do we know....?*
- Extending 'wait time' and using talking partners when questions are asked
- Creating a learning culture in which children are used to explaining and expanding on their knowledge
- Providing children with opportunities and questions for self-reflection:
 - What learning helps me best?*
 - What helps me learn when I find something difficult?*
 - What would I do differently if I did it again?*
 - What is my most significant improvement this week?*

*Using assessment to raise
achievement in mathematics*
QCA, 2003

Teachers taking forward aspects of assessment for learning have emphasised that they needed time to train themselves and the children in these techniques.

Ofsted has identified that where children understand the purpose and nature of their learning, and in some cases contribute to the planning and evaluation of the curriculum, they know what to do in order to make progress.

*Curriculum in successful
primary schools*
Ofsted 2003

Isambard Brunel Junior School has been taking this forward through sharing learning objectives with children (which are linked to either success criteria or 'I can' statements depending on the nature of the learning).

The children were trained to assess their own work initially through assessing anonymous pieces of work by using exemplars, and to try and identify where to go next. At Isambard Brunel this was developed so that children moved on to assessing their own work through traffic lighting, eg:

- red = 'I'm really not sure about this'
- amber = 'I think I've got it'
- green = 'I feel confident that I've met the learning objective'

Isambard Brunel have found that traffic lighting what is known, not known or partially known is a useful strategy when linked to knowledge-based 'I can ...' statements, eg 'I can start sentences with a capital letter'. Where appropriate, children are involved in traffic lighting their own work and this complements the teacher's assessment, which then informs future planning. Isambard Brunel developed this technique in conjunction with other work on improving children's self-esteem and motivation.

Traffic lighting is not useful when linked to learning objectives or success criteria that are more open (eg 'to be able to use effective adjectives', 'to be able to draw conclusions'). Where there is a continuum of achievement, it is difficult for children to decide 'yes', 'no' or 'maybe' and less confident children often assess themselves negatively. Where such learning objectives or success criteria exist, it can be more useful to ask children to identify the one success criterion they have best achieved and one that could be improved or developed.

At Isambard Brunel, children gradually became more proficient at identifying the strengths and areas for improvement in their work. This was also evident at St John's where Year 2 children developed peer assessment skills through linking their feedback to success criteria. Ofsted has identified that in schools where creativity is promoted effectively, both 'successes and failures' are perceived to offer learning possibilities – the learning doesn't stop with a 'right' or 'wrong' response.

Expecting the unexpected
Ofsted 2003

If you would like to take forward work on peer assessment using response partners, please see the suggestions in the Appendix at the end of this document.

Are learning intentions and success criteria planned for?

Do we make learning intentions and success criteria visually accessible during lessons?

Are we using a range of different questions (eg using Bloom's taxonomy) and techniques for all children (eg talking partners)?

Is there an expectation that in lessons children are given opportunities for self-evaluation, alone or in pairs?

Do we enable children to show what they already know before a unit of work begins?

Are there opportunities for children to suggest further questions to explore as a unit of work progresses?

How could I provide more effective feedback to children?

Feedback is the means by which teachers enable children to 'close the gap' in order to take learning forward and improve children's performance. For it to be effective, children need to take action on the feedback. All teachers provide feedback to children, which can either be oral, written, or in more practical subjects feedback through demonstration. Feedback can include teacher to children, children to children, or children to teacher.

Research about written feedback highlights some issues that need to be considered if you are moving towards a formative model of assessment:

- Learners rarely read comments, preferring to compare marks out of 10 or grade with their peers as a first reaction to getting work back
- Teachers rarely give learners time in class to read comments that are written on work and probably few, if any, learners returned to consider these at home
- Often the comments are brief and/or not specific, eg writing *details?* on a child's work
- The same written comments frequently recur in a learner's book implying that the learners do not take note of or act on the comments

*Assessment for Learning:
Putting it into practice*
Black et al, 2003

Effective feedback is about finding the best way of communicating to learners what they have achieved and what they need to work on next. It is worth considering research that suggests that feedback given as rewards or grades enhances 'ego' rather than 'task' involvement – that is that the learners compare themselves with others and their image and status, rather than encouraging them to think about the work itself and how to improve it. This focus on 'ability' rather than the importance of effort can be damaging to self-esteem, particularly in lower attainers. (This is explored further in the section in the following section on children's motivation and self-esteem.)

Feedback on what needs to be done can encourage all children to believe that they can improve – it should build on their previous achievement rather than act as a comparison with others.

- In marking feedback, adopting an approach that identifies 'three successes and an improvement' can help take learning forward. This is one of the approaches being taken forward by St John's.
- Peer and self--assessment against the learning objectives highlights the learners' success and improvement needs.

Oral feedback can provide immediate improvement for children. Teachers could consider:

- Developing questions that allow children to demonstrate their understanding and/or misconceptions, rather than using 'closed' questions with 'right/wrong' answers, eg asking *Why is 7 a prime number?* instead of *Is 7 a prime number?* will elicit very different responses from children.
- Planning for 'think time' – the research indicated that many teachers give less than one second between asking a question and expecting a response, or responding themselves. By increasing 'wait time' to allow children to think, and by expecting all children to have an answer and to be involved in the discussion, all answers right or wrong can be used to develop understanding. "The aim is thoughtful improvement rather than getting it right first time." As the video demonstrates, using 'no hands', talking partners and extending 'think time' can provide children with the opportunity to give more thoughtful responses.

See *Using assessment to
raise achievement in
mathematics* for more ideas
QCA, 2003

*Working Inside the Black
Box*
Black et al, 2002

For assessment to be formative, it is vital that teachers build in time for improvements to be made. This could be either child marking alone or partners marking together or children marking with teachers. Feedback needs to suggest specific improvements, and planning for effective feedback at regular intervals helps to target learning needs for the future.

See also *Pupils' learning from teachers' responses* AAIA, 2000
www.qca.org.uk/afi and
www.aaia.org.uk

How do we ensure that feedback is having an impact on learning?

How is feedback monitored for impact?

What changes might you need to make to your planning and classroom management to develop peer and self-assessment?

What impact does assessment have on children's motivation and self-esteem?

"Pupils will only invest effort in a task if they believe that they can achieve something. If a learning exercise is seen as a competition, then everyone is aware that there will be losers as well as winners: those who have a track record as losers will see little point in trying."

Working inside the black box
Black et al, 2002

Teachers recognise that assessment can impact children's motivation and self-esteem; used effectively it can produce positive results. However, that is not always the case and research evidence has drawn attention to a number of inhibiting factors, including:

- a tendency for teachers to assess the quantity of work and presentation, rather than the quality of learning;
- greater attention given to marking and grading, much of it tending to lower the self-esteem of children rather than to provide advice for improvement;
- a strong emphasis on comparing children with each other, which demoralises the less successful learners;
- teachers' feedback to children often serving managerial and social purposes, rather than helping them to learn more effectively.

Assessment for Learning: Beyond the black box
ARG, 1999

There are many ways in which teachers inadvertently encourage children to believe that they lack ability by comparing them to other children in various classroom contexts. The success of assessment for learning depends on teachers believing that all children can succeed and having high expectations of them. The following examples demonstrate ways that teachers have established a learning culture that builds motivation and self-esteem.

See Inside the Black Box
Black & Williams, 1998

- A teacher expects each child to achieve at some level against success criteria, for example:
 - Ingredients from which children choose
In a history lesson, year 2 children writing as eyewitnesses to the Great Fire of London had a variety of success criteria as a focus for their work, self-evaluation and feedback. They needed to include at least two in their work.
 - An expectation that all success criteria are included
A year 5 class learning to write complex sentences had these success criteria: use appropriate connectives; include main and subordinate clauses; vary the position of the sub-clause for effect.
 - An application learning intention (eg to write a whole story) with broad success criteria
A Year 6 class planning and conducting a fair test looked at the following success criteria that had been learned over their school career: make a prediction; observe and record; analyse your findings; draw conclusions; link conclusions with prediction; use the rules of fair testing after the prediction.
- 'No hands up' and talking partners as a way of involving all children in thinking and responding takes the onus off the individual, and allows the teacher to focus on the response not the child.
- Teachers say, 'Thank you. Does anyone have a different idea?' in response to a child, rather than emphasising wrong answers.

- Teachers avoid giving stickers and stars for 'best work' and instead celebrate achievement verbally within the context of all children achieving some level of success against the task criteria.
- Teachers and children feed back by identifying successes and improvement needs.

Intrinsic and extrinsic motivation illustrates the difference, between schools that are performance (ego) orientated and those that are learning (task) orientated:

Performance orientation (extrinsic)	Learning orientation (intrinsic)
Belief that ability leads to success	Belief that effort leads to success
Concern to be judged as able, concern to perform	Belief in one's ability to learn
Satisfaction from doing better than others or succeeding with little effort	Preference for challenging tasks
Emphasis on inter-personal competition and public evaluation	Derives satisfaction from personal success at difficult tasks
Helplessness: evaluates self-negativity when task is difficult	Applies problem solving and self-instructions when engaged in tasks

(based on Dweck, 1986)

Using assessment to improve learning,
Stobard, in
Whither Assessment
QCA, 2002

Enriching feedback in the primary classroom
Shirley Clarke, 2003

As mentioned in the video, it's about "taking the ego out of the learning".

Teachers and researchers have investigated ways of building children's motivation and self-esteem, and suggest doing more of the following:

- Provide choice and help children to take responsibility for their learning.
- Discuss with children the purpose of their learning and provide feedback that will help the learning process.
- Encourage children to judge their work by how much they have learned and by the progress they have made.
- Help children to understand the criteria by which their learning is assessed and to assess their own work.
- Develop children's understanding of the goals of their work in terms of what they are learning; provide feedback to children in relation to these goals.
- Help children to understand where they are in relation to learning objectives and how to make further progress.
- Give feedback that enables children to know the next steps and how to succeed in taking them.
- Encourage children to value effort and a wide range of attainments.
- Encourage collaboration among children and a positive view of each others' attainments.

Testing, motivation and learning
ARG, 2002

Are there practices in our school that encourage children to compare themselves to others leading to ego orientation (eg external rewards, words used, tone of voice, body language, using 'hands up' for question so that only some children can answer)?

How can we turn these into contexts in which children compare their achievements to previous achievements?

What are the benefits of involving children in assessing themselves?

"Pupils can only assess themselves when they have a sufficiently clear picture of the targets that their learning is meant to attain When pupils do acquire such an overview, they then become more committed and more effective as learners: their own assessments become an object of discussion with their teacher and with one another, and this promotes even further that reflection on one's own ideas that is essential to good learning."

Inside the Black Box
Black & Williams, 1998

For children to improve, they need to know where to go next and how to get there. Once children are actively involved in the learning intention of the lesson, they are able to begin assessing themselves and their own learning more effectively. Taking the ego out of the learning focuses children on the task and a realisation that their success or failure is not based on 'innate ability' but a need to tackle the task again, possibly in a different way.

Using assessment to raise achievement in mathematics
QCA, 2003

Many teachers who have taken forward AfL practice consider peer assessment a prior requirement for self-assessment. The advantages of peer assessment include:

Assessment for Learning: putting it into practice
Black et al, 2003

- peer discussion is conducted in language children normally use with one another and they accept criticisms on their work from one another;
- as the feedback is from a group, the teacher commands more attention than when it is from an individual, and this also helps strengthen the children's voice;
- it makes the teacher's task more manageable, as they are able to hear feedback from pairs and groups rather than having to circulate amongst all the children.

At Isambard Brunel children have also been involved in understanding the marking criteria of summative assessment, where children are given the criteria and trained to assess their own work. It is about children being able to look at marking criteria and identify where they are and what they need to do next. The headteacher has favoured this approach as a starting point so that it leads on to children being able to self-assess the success criteria and learning objectives on a day-to-day basis with feedback focused on improvement rather than correction.

Advantages of self-assessment	
<i>What's in it for the children?</i>	<i>What's in it for the teachers?</i>
The child becomes responsible for own learning	There is a shift of responsibility from teacher to child
is able to recognise the next steps in learning	Smoother, more efficient lessons if children are motivated and independent
feels secure about not always being right	Feedback helps teacher identify children's progress
raises self-esteem and becomes more positive, eg <i>I can</i> from <i>I can't</i>	Identifies next steps for a group/individual
is actively involved in the learning process (partner not recipient)	Matches children's perceptions of understanding with teacher – children explain strategies so teacher identifies thinking process
becomes more independent and motivated	More efficient lessons allow greater challenge

Self-assessment
AAIA North West Region
available from
www.qca.org.uk/afl and
www.aaia.org.uk

Children need to be given time to develop the skills and to actually carry out peer and self-assessment and this needs to be planned for and modelled.

What does peer and self-assessment currently look like in my classroom? Could I manage/plan it more effectively?

What might I need to consider when adjusting teaching based on the results of assessment?

"An assessment activity can help learning if it provides information to be used as feedback by teachers and their students in assessing themselves and each other, to modify teaching and learning activities in which they are engaged. Such assessment becomes *formative assessment* when the evidence is used to adapt the teaching work to meet learning needs."

*Assessment for Learning:
Putting it into practice*
Black et al, 2003

In order to take children's learning forward, it is essential that teachers identify and interpret evidence with the intention of 'closing the gap'. The evidence can come from a variety of assessments – both formative and summative, and internal or external.

Formative assessment Teacher assessment Assessment for Learning	Summative assessment Teacher assessment (TA) Assessment of Learning	Summative assessment National curriculum tests and tasks Assessment of Learning
Is integral to all lessons. Children are aware of learning objectives and success criteria and use these as the basis of self-assessment feedback. Formative assessment depends on children knowing where they are, where they want to be and how to 'close the gap'. This involves both the teacher and children in a process of continual reflection and review about progress. Effective questioning develops children's thinking. Quality feedback is used by children, and feeds into future learning. Teachers adjust their plans in response to formative assessment.	Is carried out at the end of a unit or year or key stage or when a child is leaving the school, to make judgements about children's performance to national standards. TA is rooted in level descriptions but is often given a numerical value. Teachers find standardisation and moderation meetings important quality assurance opportunities. TA is a valuable part of the data held and used for management purposes. Teachers often use information about children's performance in summative tests and their teacher assessments formatively by 'layering' targets at school, key stage, class and group level or re-focusing planning.	Provide a standard 'snapshot' of attainment at the end of key stages. A child's performance is described in relation to the national standards (levels). The optional tests for years 3, 4 and 5 also provide summative assessment information for schools to use to monitor their school's performance.

Adapted from Appendix 4
Report on teachers' perceptions of formative assessment
Ann Neesom, QCA 2000
www.qca.org.uk/afl

Obviously, teachers base their adjustments on their knowledge of the children and the interaction in the classroom. As with all aspects of assessment for learning, what is important is adopting those practices that are most relevant to the children's learning styles, teachers' experience and confidence, and school policies.

Some of the strategies that teachers might use could include:

- Teachers consider the types of assessments they currently use and how they use this information to take forward learning
- Through extended questioning and/or using talking partners, the teacher becomes aware of possible conceptual problems or deep understanding that some of the children have and makes adjustments either during the lesson or to short-term planning
- Children's self-assessments against learning objectives and success criteria are used to guide teachers' planning
- Teachers plan time in class for children to respond to written feedback

- Teachers provide anonymised pieces of children's work which are then peer-assessed to identify strengths and improvement areas
- Teachers work together to produce questions that allow children to demonstrate their understanding of topics
- Teachers use a diagnostic approach to children's writing to identify areas that individual children, groups of children or the whole class may need to concentrate on in order to improve their work
- Teachers meet across year groups to moderate pieces of children's work and identify learning needs to include in future planning
- Teachers work together on their long-term planning to identify progression in each subject, ensuring that they have an understanding of where they intend to take the learning
- At Isambard Brunel the teachers are 'traffic lighting' objectives identified in their short-term planning – if at the end of the session they decide that the learning intention has not been met they flag it 'red' and discuss alternative ways of taking forward the learning
- If children have had problems with a particular question in a lesson or test, teachers might involve children in generating and then answering their own questions
- The QCA *Implications for teaching and learning* leaflets identify areas for improvement in English, mathematics and science. Schools discuss whether these are areas that they need to consider in their planning
- Where schools are using the QCA optional tests, they decide to analyse the data using the QCA diagnostic software to identify learning needs for individual children, groups of children and whole class
- Teachers in adjoining years work together to analyse summative assessments, eg year 4 and 5 teachers both look at the papers of children taking the year 4 optional tests. This provides a benchmark for the year 5 teacher on transfer and informs planning at the start of year 5
- In smaller schools teachers use vertical grouping or peer support/tutoring (children will need to be trained in techniques)
- Children are involved in target-setting

www.qca.org.uk/tests
"Evaluation and Standards
Reports"

www.qca.org.uk/afl
'Use of data'

What is the balance between formative and summative assessments in your school?

How do teachers in your school share the results of summative assessment? Does this give a clear indication of the children's abilities and allow for more effective planning?

How do teachers in your school develop confidence in using formative assessment as an ongoing feature of lessons?

How is progression within subjects identified in order to best determine children's next steps or future learning?

“Some suggestions for children marking with a response partner”

- 1** Both partners should be roughly the same ability, or just one jump ahead or behind, rather than a wide gap.
- 2** The children need time to reflect on and check their writing before a response partner sees it.
- 3** The response partner should begin with a positive comment about the work.
- 4** The roles of both parties need to be clearly defined.
- 5** The response partner needs time to take in the child's work, so it is best for the author to read the work out first. This establishes ownership of the piece.
- 6** Children need to be trained in the success and improvement process, or whatever is being used, so that they are confident with the steps involved.
- 7** Children should both agree the part to be changed.
- 8** The author should make the marks on his or her work, as a result of the paired discussion.
- 9** Children need to be reminded that the focus of their task is the learning intention.
- 10** The response partner should ask for clarification rather than jump to conclusions.
- 11** The improvement suggestions can be verbal or written.
- 12** It would be useful to role-play response partners in front of the class, perhaps showing them the wrong way and the right way over a piece of work.
- 13** It could be useful to do this two-thirds of the way through a lesson, so that children can make the improvement, and continue writing with a better understanding of the quality.

© Shirley Clarke, *Enriching feedback in the primary classroom* (2003, Hodder & Stoughton)